encrypted signal from said first electronic device and said encrypted signal from said encryption means for supplying to said second electronic device.

--15. (Amended) The electronic transmission device according to claim 13, wherein

said authentication process means executes a second authentication process with said second electronic device through said second communication means and supplies to said second electronic device said key information for decrypting said signal selected by said signal selection means based on a result of said second authentication process.

--16. (Amended) The electronic transmission device according to claim 14, wherein

said signal selecting operation of said signal selection means is executed based on a selection signal supplied from said first electronic device.

--17. (Amended) The electronic transmission device according to claim 14, further comprising:

operation input means for conducting a switching operation of said signal selection means.--

REMARKS

Claims 1-17 remain in the application and have been

BA 1

AZ

amended hereby.

As will be noted from the Declaration, Applicant is a citizen and resident of Japan and this application originated there.

Accordingly, the amendments to the specification are made to place the application in idiomatic English, and the claims are amended to place them in better condition for examination.

An early and favorable examination on the merits is earnestly solicited.

Respectfully submitted, COOPER & DUNHAM, LLP

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JHM/AVF/pmc

VERSION WITH MARKINGS TO SHOW CHANGES MADE

IN THE ABSTRACT OF THE DISCLOSURE

The Abstract of the Disclosure has been amended as follows:

--An electronic signal transmission device comprises] including a first communication section to be connected to a first electronic device of a signal transmitting side; a second communication section to be connected to a second electronic device of a signal receiving side; an authentication section for executing an authentication process with the first electronic device and supplying key information for decryption; a decryption section for executing a decryption process of an encrypted signal supplied from the first electronic device based on the key information from the authentication process; and a supply section for directly supplying the encrypted signal from the first electronic device and the key information to the second communication section [in order] to avoid signal delay by the authentication.--

IN THE CLAIMS

Claims 1-17 have been amended as follows:

--1. (Amended) An electronic transmission device_comprising:

- [a] first and [a] second communication means to be connected to a signal transmission line;
- [an] authentication process means for executing [an] a first authentication process with a first electronic device of a signal transmitting side through at least said first communication means;
- [a] decryption means for decrypting an encrypted signal; and
- [a] processing means for executing an operation process with a signal obtained by decrypting [a] said encrypted signal at said decryption means, wherein

said authentication process means supplies key information for decrypting said encrypted signal supplied from said first electronic device based on a result of said <u>first</u> authentication process;

said first communication means supplies said encrypted signal supplied from said first electronic device connected through said signal transmission line to said decryption means and said second communication means[,]; and

said second communication means enables a connected second electronic device of a signal receiving side to transmit said encrypted signal and said key information and to execute [an] a second authentication process with said second electronic device.

--2. (Amended) The electronic transmission device according to claim 1, wherein

said authentication process means supplies <u>said</u> key information for authentication of said second electronic device and decryption of said encrypted signal from said first electronic device to said second electronic device based on [a] <u>said</u> result of said <u>first</u> authentication process.

--3. (Amended) The electronic transmission device according to claim 1, further comprising:

[an] encryption means for encrypting said decrypted signal in said decryption means and supplying said encrypted signal to said second communication means[,]; and

[a] signal selection means for selecting [either] one of said encrypted signal from said first communication means [or] and said encrypted signal from said encryption means in said second communication means.

--4. (Amended) The electronic transmission device according to claim 3, wherein

said authentication process means executes [an] <u>said</u>

<u>second</u> authentication process with said second electronic

device through said second communication means and supplies

<u>said key information</u> to said second electronic device [said

key information] for decrypting said signal selected by said

signal selection means based on [a] <u>said</u> result of said <u>second</u>

authentication process.

--5. (Amended) The electronic transmission device

according to claim 4, wherein

a signal selecting operation of said signal selection means is executed [base] <u>based</u> on a <u>selection</u> signal supplied from said first electronic device through said first communication means.

--6. (Amended) The electronic transmission device according to claim 4, further comprising:

[an] operation input means for conducting [an] \underline{a} switching operation of said signal selection means.

--7. (Amended) A signal transmission method_ comprising the steps of:

executing [an] <u>a first</u> authentication process with a first electronic device of a signal transmission side connected through a signal transmission line for connecting said first electronic device and a second electronic device;

executing [an] operation processing by using a signal obtained by decrypting [an] <u>a first</u> encrypted signal supplied from said first electronic device with key information supplied from said first electronic device based on a result of said <u>first</u> authentication process;

executing [an] a second authentication process with said second electronic device for one of signal reception connected through said signal transmission line [or] and execution of a relay for [such] said second authentication process;

transmitting said first encrypted signal supplied from

said first electronic device; and

transmitting said key information for decrypting said first encrypted signal based on [the] a result of said second authentication process.

--8. (Amended) [A] <u>The</u> signal transmission method according to claim 7, further comprising the steps of:

re-encrypting said [obtained] <u>decrypted</u> signal [by said decryption] into a [different] <u>second encrypted</u> signal; and

transmitting [either] one of said [re-encrypted] second encrypted signal [or] and said first encrypted signal supplied from said first electronic device by selection.

--9. (Amended) The signal transmission method according to claim 8, wherein

said key information to be supplied to said second electronic device is key information for decrypting said encrypted signal [to be] transmitted to said selected second electronic device.

--10. (Amended) The signal transmission method according to claim 8, wherein

said selection of [either] one of said [re-encrypted]

first encrypted signal [or] and said second encrypted signal supplied from said first electronic device is executed based on a selection signal supplied from said first electronic device.

--11. (Amended) The signal transmission method according to claim 8, wherein

said selection of [either] one of said [re-encrypted]

first encrypted signal [or] and said second encrypted signal supplied from said first electronic device is executed based on an operation result of [an] operation input means.

- --12. (Amended) An electronic signal transmission device, comprising:
- [a] first communication means to be connected to a first electronic device of a signal transmitting side;
- [a] second communication means to be connected to a second electronic device of a signal receiving side;
- [an] authentication means for executing [an] <u>a first</u> authentication process with said first electronic device and supplying key information for decryption;
- [a] decryption means for executing a decryption process of an encrypted signal supplied from said first electronic device based on said key information from said <u>first</u> authentication process; and
- [a] supply means for supplying said encrypted signal from said first electronic device and said key information to said second communication means.
- --13. (Amended) The electronic transmission device according to claim 12, wherein

said <u>first</u> authentication process means supplies <u>said</u> key

information for authentication of said second electronic device and decryption of said encrypted signal from said first electronic device to said second device based on a result of said first authentication process.

--14. (Amended) The electronic transmission device according to claim 12, further comprising:

[an] encryption means for encrypting said decrypted signal from said decryption means and supplying said encrypted signal to said second electronic device[,]; and

- [a] signal selection means for selecting [either] one of said encrypted signal from said first electronic device [or] and said encrypted signal from said encryption means for supplying to said second electronic device.
- --15. (Amended) The electronic transmission device according to claim 13, wherein

said authentication process means executes [an] a second authentication process with said second electronic device through said second communication means and supplies to said second electronic device said key information for decrypting said signal selected by said signal selection means based on a result of said second authentication process.

- --16. (Amended) The electronic transmission device according to claim 14, wherein
 - [a] said signal selecting operation of said signal

selection means is executed [base] <u>based</u> on a <u>selection</u> signal supplied from said first electronic device.

--17. (Amended) The electronic transmission device according to claim 14, further comprising:

[an] operation input means for conducting [an] \underline{a} switching operation of said signal selection means.--